

AMENDMENTS TO THE SPECIFICATION

Please amend paragraph [0007] on page 3, as follows:

According to a first aspect of the present invention, refrigeration equipment is characterized by a refrigeration unit that includes a compressor, a condenser, an expanding mechanism and an evaporator. Further according to the first aspect of the invention, a control means stores one of a plurality of refrigerating specifications. The refrigeration equipment is able to operate according to any of the plurality of refrigerating specifications.~~The invention of the first aspect is refrigeration equipment provided with a refrigeration unit that includes a compressor, a condenser, an expanding mechanism, and an evaporator, and that has such a refrigerating performance as to meet a plurality of refrigerating specifications. The refrigeration unit can be controlled based on individual programs corresponding to refrigerating specifications. The refrigeration unit is characterized by a control means storing a desired one of the programs of the refrigerating specifications and being capable of executing said one program.~~

Please amend paragraph [0008] on page 3, as follows:

According to a second aspect of the invention, the control means selects an appropriate one of the plurality of refrigerating specifications. Refrigerating equipment is operated according to the appropriate one of the plurality of refrigerating specifications.~~The invention of the second aspect is characterized in that in the refrigeration equipment according to the first aspect, the control means stores all of the refrigerating specification programs and is capable of executing a desired one of the programs.~~

Please amend paragraph [0009] on page 4, as follows:

According to a third aspect of the invention, a refrigerating storage cabinet has a heat insulating housing containing a refrigeration unit that includes a compressor, a condenser, an expanding mechanism and an evaporator. A control means stores one of a plurality of refrigerating specifications. The refrigerating unit is able to operate according to any of the plurality of refrigerating specifications stored in the control means.~~The invention of the third aspect is a refrigerating storage cabinet in which a heat~~

~~insulating housing is provided with a refrigeration unit that includes a compressor, a condenser, an expanding mechanism, and an evaporator. In addition, the refrigeration unit has such a refrigerating performance as to meet a plurality of refrigerating specifications. The refrigeration unit can be controlled based on individual refrigerating specification programs, and is characterized by a control means storing a desired one of the refrigerating specification programs and being capable of executing said one program.~~

Please amend paragraph [0010] on page 4, as follows:

According to a fourth aspect of the invention, the present invention according to the third aspect has the control device select an appropriate one of the plurality of refrigerating specifications. The refrigerating unit is operated according to the appropriate one of a plurality of refrigerating specifications.~~The invention of the fourth aspect is characterized in that in the refrigerating storage cabinet according to the third aspect, the control means stores all of the refrigerating specification programs and is capable of executing a desired one of the programs.~~

Please amend paragraph [0011] on page 4, as follows:

Further, according to a fifth aspect, the heat insulating housing comprises a condensation-preventing heater with variable heating performance located about an opening of the heat insulated housing. A switching device is provided to switch the variable heating performance of a heater to correspond to the appropriate one of the plurality of refrigerating specifications.~~The invention of the fifth aspect is characterized in that in the refrigerating storage cabinet according to the third or fourth aspects, the heat insulating housing has an opening in which a condensation-preventing heater is provided with variable heating performance. In addition, switching means is provided that is capable of switching the heating performance of the heater so that the heating performance corresponds to the refrigerating specification.~~

Please amend paragraph [0012] on pages 4-5, as follows:

[0012] According to a sixth aspect, the refrigeration unit is detachably attachable to the heat insulating housing. The refrigerating storage cabinet comprises an identifying

means for identifying the refrigerating specification of the heat insulating housing to which the refrigeration unit is detachably attached. The control means selects and executes the appropriate one of the plurality of refrigerating specifications based on an identification signal from the identifying means. ~~The invention of the sixth aspect is characterized in that in the refrigerating storage cabinet according to the fourth or fifth aspects, the refrigeration unit, provided with the control means, is detachably attachable to the heat insulating housing. In addition, identifying means is provided for identifying the refrigerating specification of the heat insulating housing to which the refrigeration unit is attached. The control means is capable of selecting and executing a corresponding one of the stored programs based on an identification signal from the identifying means.~~

Please amend paragraph [0013] on page 5, as follows:

[0013] According to a seventh aspect of the invention, the identifying means includes a detecting portion provided on one of the refrigeration unit or the heat insulating housing. The detected portion is provided on another of the heat insulated housing or the refrigeration unit. Interaction between the detecting portion and the detected portion determines the identification signal. ~~The invention of the seventh aspect is characterized in that for the refrigerating storage cabinet according to the sixth aspect, two refrigerating specifications are provided. The identifying means includes a detecting portion provided at the side of the refrigeration unit and comprising means for detecting the presence or absence of a detected portion, provided at the side of the heat insulating housing, when the refrigeration unit is attached to the heat insulating housing.~~

Please amend paragraph [0014] on page 5, as follows:

[0014] According to an eighth aspect of the invention, the identifying means comprises a set internal temperature input section for inputting a set internal temperature for the heat-insulating housing. The identifying means determines the appropriate one of the plurality of refrigerating specifications based on the set internal temperature. The invention of the eighth aspect is characterized in that for the refrigerating storage cabinet according to the sixth aspect, the identifying means includes a set internal temperature input section, to which a set internal temperature of the heat insulating housing is input.

The set internal temperature input section has the function of identifying the refrigerating specification based on the set internal temperature input.

Please amend paragraph [0015] on pages 5-6, as follows:

[0015] According to a ninth aspect of the invention, the identifying means comprises a signal recording section provided with the heat insulating housing for storing an identification signal for selecting the appropriate one of the plurality of refrigerating specifications. A reading section is capable of reading the identification signal of the signal recording section and communicating the identification signal to the control means.~~The invention of the ninth aspect is characterized in that for the refrigerating storage cabinet according to the sixth aspect, the identifying means includes a signal recording section provided on the heat insulating housing, for recording an identification signal for the refrigeration specification. Additionally, the identifying means includes a reading section that is capable of reading the identification signal of the signal recording section and inputting the identification signal to the control means.~~

Please amend paragraph [0016] on page 6, as follows:

[0016] According to a tenth aspect of the invention, the heat insulating housing comprises an information recording section storing supplementary information, information conveying means for reading and communicating the supplementary information to the control means. The supplementary information includes at least one of a size of the heat insulating housing or heat invasion amount characteristic.~~The invention of the tenth aspect is characterized in that for the refrigerating storage cabinets according to any one of the sixth through ninth aspects, the heat insulating housing is provided with an information recording section on which supplementary information, including a size of the heat insulating housing and a heat invasion amount characteristic, is recorded. In addition, information conveying means is provided for reading the information of the information recording section and conveying the information to the control means.~~

Please amend paragraph [0017] on page 6, as follows:

[0017] According to an eleventh aspect of the invention, the plurality of refrigerating specification includes a refrigerating specification for refrigeration and a refrigerating specification for freezing.~~The invention of the eleventh aspect is characterized in that for the refrigerating storage cabinets according to any one of the third through tenth aspects, the refrigerating specifications include two refrigerating specifications for refrigeration and freezing.~~

Please amend paragraph [0018] on pages 6-7, as follows:

[0018] According to a twelfth aspect of the invention, the refrigerating unit performs a pull down cooling when an internal temperature is higher than an upper limit temperature until the internal temperature drops to the upper limit temperature. The upper limit temperature is higher than a predetermined temperature by a predetermined value. The refrigerating unit performs control refrigeration when the internal temperature is at the upper limit temperature higher until the internal temperature drops to a lower limit temperature, after which the refrigerating unit is stopped, allowing the internal temperature to rise. The lower limit temperature is below the predetermined temperature by a predetermined amount. The control refrigeration is repeated, maintaining the internal temperature about the predetermined temperature. At least one of a plurality of pull down cooling characteristics or a plurality of control refrigeration characteristics are provided for controlling the refrigeration unit during the respective pull down cooling and control refrigeration. An appropriate one of the at least one of the plurality of pull down cooling characteristics is selected based upon conditions of the refrigerating storage cabinet. An appropriate one of the at least one of the plurality of control refrigeration characteristics is selected based upon the conditions of the refrigerating storage cabinet.~~The invention of the twelfth aspect is characterized in that for the refrigerating storage cabinets according to any one of the third through eleventh aspects, the refrigerating storage cabinet performs pull down cooling in which the internal atmosphere is refrigerated so that the internal temperature is decreased from a high temperature, higher than a set temperature, to near the set temperature. In addition, the refrigerating storage cabinet performs a control refrigeration in which when the internal~~

~~temperature has risen to an upper limit temperature, higher by a predetermined value than the set temperature, the refrigeration unit is operated. Additionally, when the internal temperature has dropped to a lower limit temperature, lower by a predetermined value than the set temperature, the refrigeration unit is stopped. The refrigeration unit is repeatedly operated and stopped so that the internal temperature is kept about the set temperature. The program controls the operation of the refrigerating unit in each of the pull-down cooling range and the control refrigeration range so that a physical amount with respect to refrigeration, including the internal temperature, is reduced following a refrigeration characteristic indicative of a time-varying change mode of dropping of the physical amount. A plurality of pull-down cooling characteristics and/or a plurality of control refrigeration characteristics is provided. Each refrigeration characteristic is selectively read according to a condition or the like.~~

Please insert the following paragraphs after paragraph [0018] on page 7:

[0018.1] According to a thirteenth aspect of the invention, a refrigerating storage cabinet comprises a heat insulating housing comprising a refrigeration unit which includes a compressor, a condenser, an expanding mechanism and an evaporator. A control means stores a plurality of refrigerating specifications. A detecting portion is provided on one of the heat insulated housing or the refrigerating unit. A detected portion is provided on the other of the heat insulated housing or the refrigerating unit. The control device selects an appropriate one of the plurality of refrigerating specifications based upon an interaction between the detecting portion and the detected portion. The refrigerating unit is operated according to the appropriate one of the plurality of refrigerating specifications.

[0018.2] According to a fourteenth aspect of the invention, the heat insulated housing according to the thirteenth aspect comprises a condensation-preventing heater operable at a plurality of heating performance levels located about an opening of the heat insulated housing. The switch device is provided to operate the condensation-preventing heater at an appropriate one of the plurality of heating performance levels based upon the interaction between the detecting portion and the detected portion.

[0018.3] According to a fifteenth aspect of the invention, the refrigerating storage cabinet according to the fourteenth aspect is characterized in that the plurality of refrigerating specifications includes refrigeration and freezing.

Please amend paragraph [0032] on pages 12-14, as follows:

- [FIG. 1] A perspective view of a refrigerator-freezer in accordance with embodiment 1 of the present invention;
- [FIG. 2] An exploded perspective view of the refrigerator-freezer;
- [FIG. 3] A refrigerating circuit diagram;
- [FIG. 4] A partial section of the refrigerator-freezer in which a refrigeration unit is mounted;
- [FIG. 5A and FIG. 5B]~~[FIG. 5]~~ Graphs showing pressure changes in a capillary tube;
- [FIG. 6] A graph showing temperature curves in pull down cooling ranges;
- [FIG. 7] A block diagram of a control mechanism of an inverter compressor;
- [FIG. 8] A graph showing an ideal temperature curve under pull down cooling;
- [FIG. 9] A flowchart showing the control of the inverter compressor;
- [FIG. 10] A graph showing a temperature curve in a control refrigeration range;
- [FIG. 11] A graph showing internal temperature characteristics on the refrigeration side and on the freezing side for the purposes of comparison;
- [FIG. 12] An exploded perspective view of the ceiling of a freezing compartment;
- [FIG. 13] A partial exploded perspective view of identifying means;
- [FIG. 14] A flowchart showing the function of a selector;
- [FIG. 15] A partial exploded perspective view of an identifying unit of modified form 1;
- [FIG. 16] A partial exploded perspective view of an identifying unit of modified form 2;
- [FIG. 17] A partial exploded perspective view of an identifying unit of modified form 3;

[FIG. 18] A partial exploded perspective view of the refrigerator-freezer in which a refrigeration unit is mounted, in embodiment 2 of the present invention;

[FIG. 19] A block diagram showing embodiment 3 of the present invention;

[FIG. 20] A flowchart showing operation of embodiment 3;

[FIG. 21] A refrigerating circuit diagram in embodiment 4;

[FIG. 22] A partially enlarged view of the circuit of FIG. 21;

[FIG. 23] An exploded perspective view of refrigerating storage in accordance with embodiment 5;

[FIG. 24] A circuit diagram of a switching portion of a condensation-preventing heater;

[FIG. 25] A circuit diagram of a modified form of embodiment 5; and

[FIG. 26] A graph showing a manner of refrigeration control in embodiment 6.

Please amend paragraph [0058] on page 24, as follows:

In the refrigerating circuit 31 with the capillary tube 35, the high-pressure side and the low-pressure side basically share the refrigerant. Conceptually, the refrigerant is in the condenser 33 and the evaporator 36 in the refrigeration range (including the pull down cooling range). Whereas, in the freezing range a large amount of refrigerant is in the evaporator 36 and accumulator 42 and a small amount of refrigerant is in the condenser 33. As a result, the refrigerant enters into the capillary tube 35 as a completely liquid flow in the refrigerating range. However, since the refrigerant flows in a mixed gas-liquid state in the freezing range, the flow rate of the refrigerant is reduced. Consequently, even when heat exchange is carried out at a position near the inlet of the capillary tube 35 such that the excessive cooling occurs, the flow rate of the refrigerant is not drastically increased.